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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/566,519	01/30/2006	Akira Yoshida	01050-1010	7130

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DITTHAVONG MORI & STEINER, P.C.  
918 Prince St.  
Alexandria, VA 22314

EXAMINER
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TORRES VELAZQUEZ, NORCA LIZ

ART UNIT	PAPER NUMBER
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1794

MAIL DATE	DELIVERY MODE
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06/22/2009

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	Application No. 10/566,519		Applicant(s) YOSHIDA ET AL.	
	Examiner Norca L. Torres-Velazquez		Art Unit 1794	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

1) ☒ Responsive to communication(s) filed on 26 January 2009.

2a) ☒ This action is FINAL.                      2b) ☐ This action is non-final.

3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

4) ☒ Claim(s) 1,2 and 5-21 is/are pending in the application.

4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.

5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.

6) ☒ Claim(s) 1,2 and 5-21 is/are rejected.

7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.

8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

9) ☐ The specification is objected to by the Examiner.

10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
       Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
       Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
       a) ☐ All    b) ☐ Some \*    c) ☐ None of:  
           1. ☐ Certified copies of the priority documents have been received.  
           2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
           3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
       \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

1) ☐ Notice of References Cited (PTO-892)

2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
       Paper No(s)/Mail Date \_\_\_\_\_

4) ☐ Interview Summary (PTO-413)  
       Paper No(s)/Mail Date. \_\_\_\_\_

5) ☐ Notice of Informal Patent Application

6) ☐ Other: \_\_\_\_\_

**DETAILED ACTION**

***Response to Amendment***

1. The amendments and arguments submitted on January 26, 2009 have been entered and considered herein.

***Claim Rejections - 35 USC § 112***

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 1-2, 5-12 and 20-21 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. The limitation "wherein said softening temperature of said first component is lower than a hot-press forming temperature of an object to be pressed" in claims 1 and 2 renders the claims indefinite as it doesn't define the softening temperature of the first component. Anything could be pressed, thus, the softening temperature of the first component of the cushioning material would be dependent on a temperature that is not defined in the claimed. Accordingly, claims 5-12 and 20-21 are also rejected as being dependent on an indefinite claim.

***Claim Rejections - 35 USC § 102***

4. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
5. Claims 1 and 12 are rejected under 35 U.S.C. 102(b) as being anticipated by TANAKA (S63-9598Y2).

TANAKA relates to a cushioning material that is characterized in that a first fibrous layer comprises heat-resistant aromatic polyamide fiber and a second fibrous layer comprising heat-resistant fiber having a lower melting point than the first layer and then are needle-punched. The reference teaches the use of aromatic polyamide fibers with fibers such as polyamide and polyester. (Refer to translated Abstract) With regards to the new limitations requiring that the nonwoven fabric "is cooled, while maintaining compression, to a temperature lower than said softening temperature of said first component, such that a solidified state of said first component restrains said second component in a compressed state to maintain an elastic restoring force of said second component", it is the Examiner's position that said limitations constitute method limitations not germane to the final product. The presence of process limitations on product claims in which the product does not otherwise patentably distinguish over the prior art, cannot impart patentability to the product (*In re Stephens*, 145 USPQ 656). It appears that the claimed product is the same or similar to that of the prior art, although produced by a different process. As such, the burden shifts to Applicant to come forward with evidence establishing an unobvious difference between the claimed product and the prior art product. (*In re Marosi*, 218 USPQ 289, 292)

6. Claims 2 are rejected under 35 U.S.C. 102(b) as being anticipated by YOSHIDA (EP 1462233 A1).

YOSHIDA discloses a cushioning pad for hot pressing that has a nonwoven fabric made of a mixed fiber of a fiber A and a fiber B. Fiber A is an aromatic polyamide fiber. (Abstract, [0020]) Fiber B is a polybenzazole fiber. (Refer to [0012], [0026]) The reference teaches a blend ratio of fiber A to fiber B in the range of 95/5 to 55/45. [0031] With regards to claims 13-

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19, the reference teaches a method that reads on the claimed process. (Refer to [0018] and [0051]) The reference further teaches lamination the nonwoven material to a woven fabric made of heat resistant fiber by needle punch. [0032] It is further noted that the reference teaches laminating a woven fabric to the nonwoven material by needle punch in order to provide dimensional stability to the cushioning pad. [0032]

The Examiner equates Fiber A of the reference to the second component of claimed in the present invention and Fiber B to the first component.

With regards to the new limitations requiring that the nonwoven fabric "is cooled, while maintaining compression, to a temperature lower than said softening temperature of said first component, such that a solidified state of said first component restrains said second component in a compressed state to maintain an elastic restoring force of said second component", it is the Examiner's position that said limitations constitute method limitations not germane to the final product. The presence of process limitations on product claims in which the product does not otherwise patentably distinguish over the prior art, cannot impart patentability to the product (*In re Stephens*, 145 USPQ 656). It appears that the claimed product is the same or similar to that of the prior art, although produced by a different process. As such, the burden shifts to Applicant to come forward with evidence establishing an unobvious difference between the claimed product and the prior art product. (*In re Marosi*, 218 USPQ 289, 292)

***Claim Rejections - 35 USC § 102/103***

7. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

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**8. Claims 1-2, 5 and 7-10 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over KOCHESKY et al. (US 5,284,704).**

KOCHESKY et al. discloses fibers comprising 10 to 100% of bicomponent fibers, composed of a core polymer covered by a sheath polymer. The reference teaches that the products are used for example for drive belts, among other applications. (Abstract) The reference teaches a nonwoven fabric made from bicomponent fibers having a polyester core polymer surrounded by a polyester sheath polymer, the fibers are needled and heat treated. (Refer to Claim 1) On claim 6, the reference further teaches a blend of bicomponent polyester fibers and other fibers selected from the group consisting of rayon, nylon, acrylic and wool fibers.

It is the Examiner's interpretation that the nonwoven fabric taught by the KOCHESKY et al. reference reads on the nonwoven fabric of the present invention. With regard to the recited intended use as a hot-press cushioning material, it is the position of the Examiner that since prior art or record meets all of the structural limitations there is nothing on record to evidence that the nonwoven fabric taught by KOCHESKY et al., would not function in the desired capacity. Applicant is invited to evidence otherwise.

With regards to the new limitations requiring that the nonwoven fabric "is cooled, while maintaining compression, to a temperature lower than said softening temperature of said first component, such that a solidified state of said first component restrains said second component in a compressed state to maintain an elastic restoring force of said second component", it is the Examiner's position that said limitations constitute method limitations not germane to the final product. The presence of process limitations on product claims in which the product does not

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otherwise patentably distinguish over the prior art, cannot impart patentability to the product (*In re Stephens*, 145 USPQ 656). It appears that the claimed product is the same or similar to that of the prior art, although produced by a different process. As such, the burden shifts to Applicant to come forward with evidence establishing an unobvious difference between the claimed product and the prior art product. (*In re Marosi*, 218 USPQ 289, 292)

***Claim Rejections - 35 USC § 103***

9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

10. **Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over KOCHESKY et al. (US 5,284,704) as applied above, and further in view of TANAKA (S63-9598Y2).**

TANAKA relates to a cushioning material that is characterized in that a first fibrous layer comprises heat-resistant aromatic polyamide fiber and a second fibrous layer comprising heat-resistant fiber having a lower melting point than this are needle-punched. The reference teaches the use of aromatic polyamide fibers with fibers such as polyamide and polyester. (Refer to translated Abstract)

Thus, it would have been obvious to one having ordinary skill in the art of cushioning materials to provide the nonwoven of KOCHESKY et al. with a composition that includes an aromatic polyamide component and a polyester in order to produce a material suitable for molding press that does not require the use of a binding agent as taught by TANAKA. (Refer to Abstract)

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**11. Claims 11 and 13-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over KOCHESKY et al. (US 5,284,704) as applied to claim 1 above, and further in view of YOSHIDA (EP 1462233 A1).**

YOSHIDA discloses a cushioning pad for hot pressing that has a nonwoven fabric made of a mixed fiber of a fiber A and a fiber B. Fiber A is an aromatic polyamide fiber. (Abstract, [0020]) The reference further teaches lamination the nonwoven material to a woven fabric made of heat resistant fiber by needle punch. [0032] With regards to claim 20, YOSHIDA teaches the production of a laminate such as a printed circuit board. [0002] With regards to claims 13-19, it is noted that YOSHIDA teaches the use of heating/pressurizing means to laminate the material. ([0018], [0051])

Thus, it would have been obvious to one having ordinary skill in the art of cushioning materials to provide the nonwoven of KOCHESKY et al. with a woven fabric laminated to it in order to provide dimensional stability to the cushioning pad as taught by YOSHIDA. (Refer to [0032]) Further, it would have been obvious to one having ordinary skill in the art to use a heat/pressurizing method to produce the cushion motivated by the desire of producing a cushioning pad which is relatively bulky in a non-pressurized state, that has a large amount of change in the thickness in a pressurized state, and has a superior recovery property of the thickness when the pressurization is cancelled. [0027]

***Response to Arguments***

**12. Applicant's arguments filed January 26, 2009 have been fully considered but they are not persuasive.**



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a. As noted above, the new limitations requiring that the nonwoven fabric "is cooled, while maintaining compression, to a temperature lower than said softening temperature of said first component, such that a solidified state of said first component restrains said second component in a compressed state to maintain an elastic restoring force of said second component", it is the Examiner's position that said limitations constitute method limitations not germane to the final product. The presence of process limitations on product claims in which the product does not otherwise patentably distinguish over the prior art, cannot impart patentability to the product (*In re Stephens*, 145 USPQ 656). It appears that the claimed product is the same or similar to that of the prior art, although produced by a different process. As such, the burden shifts to Applicant to come forward with evidence establishing an unobvious difference between the claimed product and the prior art product. (*In re Marosi*, 218 USPQ 289, 292)

b. With regards to arguments indicating that the prior art of record fails to meet the claimed softening temperatures, it is noted herein that the materials taught by the prior art are similar to those used in the present invention, therefore, the relation of softening temperature will be similar to that claimed herein.

#### ***Conclusion***

13. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO**

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MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

14. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Norca L. Torres-Velazquez whose telephone number is 571-272-1484. The examiner can normally be reached on Monday-Thursday 8:00-5:00 pm and alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Larry Tarazano can be reached on 571-272-1515. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Norca L. Torres-Velazquez/  
Primary Examiner, Art Unit 1794

May 4, 2009